



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/798,186	03/10/2004	Hideo Namiki	USHIP001	5295
22434	7590	02/09/2007		
BEYER WEAVER LLP P.O. BOX 70250 OAKLAND, CA 94612-0250			EXAMINER CHORBAJI, MONZER R	
			ART UNIT	PAPER NUMBER
			1744	

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
3 MONTHS	02/09/2007	PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

<b>Office Action Summary</b>	<b>Application No.</b> 10/798,186	<b>Applicant(s)</b> NAMIKI ET AL.	
	<b>Examiner</b> MONZER R. CHORBAJI	<b>Art Unit</b> 1744	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 10 March 2004.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-16 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-16 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 10 March 2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |   |   |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)  | 5) <input type="checkbox"/> Notice of Informal Patent Application                       |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date <u>8/9/04</u> . | 6) <input type="checkbox"/> Other: _____  |

### DETAILED ACTION

**This general action is in response to the application filing date of 03/10/2004**

#### ***Claim Rejections - 35 USC § 102***

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 1-3, 5, 11 and 16 are rejected under 35 U.S.C. 102(b) as being anticipated by Holter (U.S.P.N. 6,375,721).

Regarding claims 1, 11 and 16, Holter discloses an air purification filter (col.1, lines 37-40) that is soaked in an antibody solution (col.3, lines 27-36) where the filter is installed in conventional indoor conditioning systems (col.2, lines 27-29). The filter is made up of non-woven cloth (col.2, lines 49-50). Indoor conditioning units inherently have air intake and outlet ducts. The treated filter is capable of removing antigens such as bacteria or mold or viruses that are present in air (abstract, lines 13-16). As to the feature of utilizing antibodies generated from livestock animals, it is considered intended use not further limiting the scope of the claims. Holter's filter is capable of being soaked with various types of antibodies regardless if the source is from an animal or a human. See MPEP 2114.

Regarding claim 2-3 and 5, Holter discloses the following: the presence of bacteria and spores in the air (abstract, lines 13-16), the filter is made up of non-woven

Art Unit: 1744

cloth (col.2, lines 49-50) and soaking the filter in an antibody solution (col.3, lines 27-36) where soaking necessarily requires a container for holding the solution.

***Claim Rejections - 35 USC § 103***

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

5. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

Art Unit: 1744

6. Claim 4 is rejected under 35 U.S.C. 103(a) as being unpatentable over Holter (U.S.P.N. 6,375,721) as applied to claim 2 and further in view of Bilsky (U.S.P.N. 1,716,480).

Holter discloses an air purification filter having a casing (col.3, lines 5-7, for example, a honeycomb filter has a casing around the screen plate); however, he fails to teach having plurality of lateral and alternating plates within the casing. Blisky's air treatment device includes a casing that is within it a plurality of lateral and alternating screening plates (figure 1:34, 21, 22 and 40) are positioned so that maximal chemical absorbing effect is accomplished (page 2, left column, lines 2-7). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to substitute Holter's honeycomb filter with Blisky's gas absorbing device so that maximal absorption of chemicals present in indoor air is accomplished (page 2, left column, lines 2-7).

7. Claim 6 is rejected under 35 U.S.C. 103(a) as being unpatentable over Holter (U.S.P.N. 6,375,721) as applied to claim 2 and further in view of Wolcott (U.S.P.N. 1,479,270).

Holter discloses soaking an air-purifying filter into an antibody solution (col.3, lines 27-35), but fails to teach placing sprayers within an air treatment system. Wolcott places spray nozzles (figure 1:4) in an air treatment conduit (figure 1:1) since it is known for removing suspended particles contained within the air stream. Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to additionally place sprayers in combination with treated filters in ducts of indoor air

Art Unit: 1744

treatment assemblies of Holter's system as taught by Wolcott in order to remove suspended particles present in air streams (Wolcott, col.1, lines 13-21).

8. Claims 7-10 and 12-15 are rejected under 35 U.S.C. 103(a) as being unpatentable over Holter (U.S.P.N. 6,375,721) as applied to claims 2, 11 and further in view of Stolle (Translation of JP 08-231425).

Regarding claims 7-10 and 12-15, Holter fails to explicitly provide the source of his antibodies; however, Stolle teaches that in the art of generating antibodies eggs from hens (Detailed Description, paragraph 0008, paragraph 0009 and paragraph 0016) milk from livestock are considered sources of antibodies through the process of passive immunization. Thus, it would have been obvious to one of ordinary skill in the art at the time the invention was made to provide animal antibodies into the process of Holter as taught by Stolle since antibodies from humans has constraints and is impractical (Stolle, Detailed Description, paragraph 0005).

### ***Conclusion***

9. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Taisuke (IDS, 06-091117) teaches impregnating filters with antibiotics in the submitted abstract. The Wikipedia definition of antibodies teaches that passive immunization is known to utilize animals.

10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to MONZER R. CHORBAJI whose telephone number is (571) 272-1271. The examiner can normally be reached on M-F 9:00-5:30.

Art Unit: 1744

11. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, GLADYS J. CORCORAN can be reached on (571) 272-1214. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

12. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

  
GLADYS J. CORCORAN  
SUPERVISORY PATENT EXAMINER

MRC